Remarks/Arguments

The preceding amendments and following remarks are submitted in response to the Final Office Action of the Examiner mailed January 23, 2004, setting a three month shortened statutory period for response ending April 23, 2004. Claims 1 and 3-21 remain pending. Claim 2 has been canceled without prejudice. Reconsideration, examination and allowance of all pending claims are respectfully requested.

In paragraph 1 of the Office Action, the Examiner states that the Declaration filed on 30 October 2003 under 37 CFR 1.131 is ineffective to overcome the Yang et al. reference. In paragraph 2 of the Office Action, the Examiner states that the evidence submitted is insufficient to establish a conception of the invention prior to the effective date of Yang et al. The Examiner states that it is unclear whether the Declaration shows conception of the invention or reduction to practice.

Enclosed herewith is a "SUPPLEMENTAL DECLARATION UNDER RULE 1.131", which clearly establishes a reduction to practice of all claims prior to the effective date of the Yang et al. reference. As such, Applicant respectfully requests that the Examiner withdraw all rejections that are based on the Yang et al. reference in view of the inventors' Declaration and Supplemental Declaration of Prior Invention. Applicant believes that this includes the rejections of claims 1, 3-6, and 8-21.

In paragraph 26 of the Office Action, the Examiner rejected claim 7 under 35 U.S.C. § 103(a) as being anticipated by Stellwagen, Jr. as applied to claim 1 above, and further in view of Blake et al. (U.S. Patent No. 6,067,412). The Examiner states that Stellwagen, Jr. fails to suggest the features of claim 7 underlined below:

7.   (Presently Amended) ... wherein said user defined workload requirement <u>includes a baseline system transactions per second, and said output includes a calculated transactions per second value, and a ratio of said calculated transactions per second to said baseline transactions per second, and wherein said determining step determines values for said calculated transactions per second and said transactions per second ratio.</u>

However, the Examiner states that Blake suggests the use of baseline systems, the use of

transactions per second, the use of calculations, the use of values, and the use of ratios. The

Examiner states that it would have been obvious to one of ordinary skill in the art at the time of

the invention to combine Blake and Stellwagen since Stellwagen and Blake teach the use of

computers, the use of databases, the use of networks, the use of clients, the use of servers, the use

of hardware, the use of software, the use of workloads, and the use of requirements. The

Examiner further states that Stellwagen provides a proposed database management system server

and Blake provides a baseline system for the performance of the server.

After carefully reviewing both Stellwagen, Jr. and Blake et al., Applicant must

respectfully disagree. Claim 7 recites:

> ... wherein said user defined workload requirement includes a baseline
> system transactions per second, and said output includes a calculated transactions
> per second value, and a ratio of said calculated transactions per second to said
> baseline transactions per second, and wherein said determining step determines
> values for said calculated transactions per second and said transactions per second
> ratio.

As can be seen, claim 7 recites that the <u>user defined workload requirement</u> includes <u>a baseline</u>

<u>system transactions per second</u>. Claim 7 also recites that <u>the output</u> includes <u>a calculated</u>

<u>transactions per second value</u>, and <u>a ratio of said calculated transactions per second to said</u>

<u>baseline transactions per second</u>. Claim 7 further recites that the determining step determines

values for said calculated transactions per second and said transactions per second ratio.

In paragraph 30 of the Office Action, the Examiner states that two references in Blake are

being combined, namely, column 9, lines 44-49 and column 2, lines 8-10, which state:

> "…This information about the performance of the operating system is preferably
> generated during the construction of the model by using the synthetic workload
> generator to apply workloads to a baseline computer system and using the actual
> performance measurements as an indication of the operating system
> performance…." (citing Blake et al., column 9, lines 44-49).

> "Thus, if the current CPU was replaced by a CPU that was twice as fast, the
> computer system still could only handle 2 transactions per second …" (Blake et
> al., column 2, lines 8-10).

(Emphasis Added). From this, the Examiner concludes that it is abundantly clear that the

combining of these two teachings suggests the phrase "baseline system transactions per second",

since Blake uses baseline computer systems and a common measure to define a baseline

transactions per second.

The first cited passage of Blake et al. suggests using a synthetic workload generator to

apply workloads to a baseline computer system. However, this does not suggest a user defined

workload requirement that includes a baseline system transactions per second, as recited in claim

7. The synthetic workload generator of Blake et al. is further discussed under the heading

"Synthetic Workload Generator" in column 12 of Blake et al. Table 3 of that section contains a

listing of preferred workload parameters. Table 3 is reproduced below for the Examiner's

convenience:

TABLE 3

WORKLOAD PARAMETER	DEFINITION
Code RAM Demand	The average amount of RAM used by the workload code.
Data RAM Demand	The average amount of RAM used by the workload data.
Local Paging Affinity	The fraction of paging on local disks, as opposed to on the network.
Sequential Read Processing	The amount of application processor time on the baseline system between sequential reads of disk or network.
Sequential Write Processing	The amount of application processor time on the baseline system between sequential writes to disk or network.
Random Read Processing	The amount of application processor time on the baseline system between random access reads from disk or network.
Random Write Processing	The amount of application processor time on the baseline system between random access writes to disk or network.
Sequential Read Size	The size of each sequential read from disk.
Sequential Write Size	The size of each sequential write to disk.
Random Read Size	The size of each random access read from disk.
Random Write Size	The size of each random access write to disk.
Local Sequential Read Affinity	The fraction of sequential reads to local disk, as opposed to the network.
Local Sequential Write Affinity	The fraction of sequential writes to local disk, as opposed to the network.
Local Random Read Affinity	The fraction of random reads to local disk, as opposed to the network.
Local Random Write Affinity	The fraction of random writes to local disk, as opposed to the network.
Random Read Extent	The size of the portion of the disk being randomly read.
Random Write Extent	The size of the portion of the disk being randomly written.

As can be seen, none of the workload parameters provided in Table 3 of Blake et al. appear to even remotely relate to a user defined workload requirement that includes a baseline system transactions per second, as recited in claim 7. Instead, they all appear to relate to workload parameters for very specific functions within a computer system, and not an overall transaction per second parameter of a baseline system. As such, Blake et al. would appear to teach away from the claimed invention.

The second passage of Blake et al. cited by the Examiner, namely column 2, lines 8-10 of Blake et al., appears to add little to the discussion. The paragraph at column 1, line 62 through column 2, line 23 appears to be merely describing the nature of a bottleneck within a computer system. The specific passage cited by the Examiner appears to just be providing one example of

a bottleneck within a computer system, where the disk is the limiting resource. As can readily be seen, nothing in this paragraph appears to suggest a user defined workload requirement that includes <u>a baseline system transactions per second</u>, as recited in claim 7.

As noted above, the Examiner states that the combining of the two above-cited passages suggests the <u>phrase</u> "baseline system transactions per second", since Blake uses baseline computer systems and a common measure to define a baseline transactions per second. However, merely suggesting the phrase "baseline system transactions per second" without more is insufficient to suggest the use of a <u>user defined workload requirement</u> that <u>includes a baseline system transactions per second</u>. Merely mentioning that a measure of a computer system's performance can be expressed in transactions per second does not suggest the use of a <u>user defined workload requirement</u> that <u>includes a baseline system transactions per second</u>, as recited in claim 7. In fact, and as described above, none of the workload parameters provided in Table 3 of Blake et al. appear to even remotely relate to a user defined workload requirement that includes <u>a baseline system transactions per second</u>, as recited in claim 7.

In addition to the foregoing, neither of the above-cited passages of Blake discloses or suggests providing an <u>output</u> that includes: (1) a <u>calculated transactions per second value</u>; or (2) a <u>ratio</u> of said <u>calculated transactions per second</u> to said <u>baseline transactions per second</u>, as recited in claim 7.

First, in paragraph 31 of the Office Action, the Examiner attempts to combine two completely unrelated portions of Blake et al. to make the argument that Blake et al. suggests providing an output that includes <u>a calculated transactions per second value</u>. Applicant believes this is completely inappropriate. More specifically, the Examiner states that column 8, lines 63-

65 of Blake et al. states "...Each entry contains the name of the operating system characteristic

and a value or formula for **calculating** a value...". However, there is no suggestion whatsoever

that the "value" referenced in this passage includes a calculated transactions per second value. In

fact, the sentences that immediately follow the cited sentence states

> [f]or example, one entry row 34 contains the name 'Spooler_RAM_Demand', and
> a value of 1.2. This entry represents the amount of RAM (in mega bytes) that is
> required by the spooler of the operating system.

As can be seen, when take in context, the value referenced by the Examiner relates to the amount

of RAM required, which is clearly not a calculated transactions per second value. In addition,

the entry appears to be an input to Blake et al., and not an output as recited in claim 7.

In an attempt to suggest that the "value" in the above-passage could be a calculated

transactions per second value, the Examiner cites to column 2, lines 8-10 of Blake et al., which

states:

> "Thus, if the current CPU was replaced by a CPU that was twice as fast, the
> computer system still could only handle 2 transactions per second ..." (Blake et
> al., column 2, lines 8-10).

(Emphasis Added). From this, the Examiner concludes that it is abundantly clear that the

combining of these two teachings suggests the phrase "calculated transactions per second", since

Blake uses calculated computer system values and a common measure to define a baseline in

transactions per second. However, the paragraph at column 1, line 62 through column 2, line 23

merely describes the nature of a bottleneck within a computer system. The portion specifically

cited by the Examiner appears to just provide one example of a bottleneck within a computer

system, where the disk is the limiting resource. Nothing in this paragraph suggest that the value

recited in the first cited passage could or should be a "calculated transactions per second" value

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as the Examiner suggests.

In addition, and as noted above, the first passage cited by the Examiner appears to relate to an input to the Blake et al. system, and therefore, even it the "value" could be a "calculated transactions per second" value, it clearly does not suggest the desirability of providing an output that includes a calculated transactions per second value, as recited in claim 7.

Second, and also in paragraph 31 of the Office Action, the Examiner states that Blake et al. teach the use of a ratio of said calculated transactions per second to said baseline transactions per second, citing column 6, lines 62-64 of Blake et al. Column 6, lines 62-63 of Blake et al. is taken from Table 1, the cited portion of which is reproduced below:

TABLE 1

```
// The following are NT characteristics or can be measured directly.
  System_Paged:                          ["megabytes"]
                        CSRSS  RAM  Demand +
                        Spooler  RAM  Demand -
                        Pool_Paged +
                        System  Code  Paged ı
                        System_Nominal_Available_Bytes
  System_Nor_Paged:                      ["megabytes"]
                        Pool  Non  Paged +
                        Kernel  Non  Paged +
                        Protocol_Non_Paged -
                        Drivers_Non_Paged ı
// Relative  Memory  Size is a property of installed processor type.
  Relative_Memory_Usage:                 ["ratio"]
                        Index(Relative  Memory  Size,
                              Installed_Processor_Index - 1)
  RAM  Demand:          ["megabytes"]
                        (
```

First, it does not appear that the cited portion of Blake et al. even remotely relates to an output that includes a calculated transactions per second value, and a ratio of said calculated transactions per second to said baseline transactions per second. According to Blake et al., Table

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1 contains a listing of the equations corresponding to the portion of the model shown in FIG. 3

(Blake et al., column 6, lines 44-46). Thus, it the ratio cited by the Examiner would appear to be

an input to the Blake et al. system, and not an output as recited in claim 7. Moreover, it is clear

that the cited portion of Table 1 relates to a relative memory size and a relative memory usage,

which does not appear to be related in any way to providing an output that includes a ratio of

said calculated transactions per second to said baseline transactions per second, as recited in

claim 7.

In view of the foregoing, Applicants believe it is clear that neither Stellwagen, Jr. nor

Blake et al. suggest many of the features of claim 7, and therefore, Applicant must respectfully

traverse the Examiner's rejection of claim 7.

In paragraph 10 of the Office Action, the Examiner rejected claims 8-21 under 35 U.S.C.

§ 103(a) as being unpatentable over Stellwagen, Jr. as applied to claim 1 above, and further in

view of Yang et al. (U.S. Patent No. 6,542,854). As noted above, Yang et al. is removed as a

reference as a result of the inventors' Declaration and Supplemental Declaration under 37 C.F.R.

§ 1.131. As such, claims 8-21 are believed to be clearly in condition for allowance.

In view of the foregoing, Applicant believes that all pending claims 1 and 3-21 are in

condition for allowance. Reexamination and reconsideration are respectfully requested. If the

Examiner believes it would be beneficial to discuss the application or its examination in any

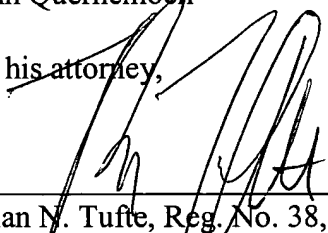way, please call the undersigned attorney at (612) 359-9348.

Respectfully submitted,

John Quernemoen

By his attorney,

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Brian N. Tufte, Reg. No. 38,638
CROMPTON, SEAGER & TUFTE, LLC
1221 Nicollet Avenue, Suite 800
Minneapolis, MN 55403-2402
Telephone: (612) 677-9050
Facsimile: (612) 359-9349